## ABASTRACT OF THE INVENTION

A non-contact position sensor including a first stator having two magnet facing sides, a second stator having one magnet facing side aligned with the two magnet facing sides along a locus, a hall element between the first and second stators, and two magnets located next to each other along the locus opposite the three magnet facing sides so as to move freely along the locus. When configured as a rotary sensor, an arbitrary angle of usage can be set. When configured as a linear sensor, a magnet can be made thick without increasing leakage of magnetic flux.